

stand-alone computing device but only acts in concert with a host device. The host device can be a portable computing device, such as, for example, a smart phone, media player, tablet computer, or other portable computing device.

[0019] In one embodiment, the accessory device can have a form factor of a laptop computer having a display and a keyboard as well as other output/input devices known to be available with a laptop computer. The accessory device, however, does not have the processing resources (such as a CPU) generally associated with a conventional laptop computer. In this regard, the host device can provide the necessary computing resources, but it is the accessory device that provides additional functionality, such as a large display, enhanced audio capabilities, and further input means. These can include, for example, a mouse, track pad, keyboard, and the like.

[0020] The accessory device can take many forms. Configured along the lines of a laptop, the accessory device can include a multi-part housing having a top case and a bottom case. The top case can be joined to the bottom case at a reveal to form a laptop accessory device. The laptop accessory device can have top case (i.e. an upper portion or lid) that can house a display screen and other related components, whereas the bottom case (i.e., base portion) can house various processors, drives, ports, battery, keyboard, touchpad and the like.

[0021] The base portion can include a port having a size and shape that can accommodate insertion and retention of a host device. In the context of this discussion and without loss of generality, the host device can take the form of a handheld computing device along the lines of a smart phone, media player, or small tablet device. The port can also include a means for communication between the host device and laptop accessory device. This means for communication can include ports and connectors for wired communication and/or suitable means for wireless communication. The wireless communication protocol can include WiFi, Bluetooth (BT), wireless telephony (LTE, GSM, etc.) or any appropriate radio access technology (RAT). Communication between the host device and the laptop accessory device can include data transfer and power transfer. In one embodiment, the laptop accessory device can include a power supply such as a battery that can be used to power the host device and/or be used to charge up a battery carried by and used to power the host device. In one embodiment, the laptop accessory device can receive external power that can be used to both operate the laptop accessory device and the host device thereby preserving battery resources. In some embodiments the accessory device can be powered by the host device.

[0022] In one embodiment, the host device can include a user input device that can receive an input event that can be interpreted by the host device. The host device can then control aspects of either or both the host device and the laptop accessory device. In one embodiment, the user input device can take the form of a touch screen. The touch screen of the host device can receive a user input and control aspects of the laptop accessory device, much like a trackpad of a laptop device. In one embodiment, the user input device can take the form of a microphone used for receiving audible content. In one embodiment, the host device can use audio equipment associated with the accessory device to output audible sound along the lines of music. In one embodiment,

the host device can access a memory device carried by the accessory device such that the host device can retrieve and store information therein.

[0023] The multipart housing can be formed of a strong and durable yet lightweight material. Such materials can include composite materials and or metals such as aluminum. Aluminum has a number of characteristics that make it a good choice for the multipart housing. For example, aluminum is a good electrical conductor that can provide good electrical ground and it can be easily machined and has well known metallurgical characteristics. The superior conductivity of aluminum provides a good chassis ground for internal electrical components arranged to fit and operate within the housing. The aluminum housing also provides a good electromagnetic interference (EMI) shield protecting sensitive electronic components from external electromagnetic radiation as well as reducing electromagnetic radiation emanating from the portable computing device. In this way, the host device and the accessory device can be isolated from each other in that EMI from either device does not affect the other.

[0024] In addition to the keyboard, the accessory device can include a touch sensitive device along the lines of a touch pad, touch screen, etc. In those embodiments where the portable computing device includes a touch pad the touch pad can be formed from a glass material. The glass material provides a cosmetic surface and is the primary source of structural rigidity for the touchpad. The use of the glass material in this way significantly reduces the overall thickness of the touchpad compared to previous designs. The touchpad can include circuitry for processing signals from a sensor associated with the touchpad. In one embodiment, the circuitry can be embodied as a printed circuit board (PCB). The PCB can be formed of material and placed in such a way that provides structural support for the touchpad. Thus, a separate touchpad support is eliminated.

[0025] These and other embodiments are discussed below with reference to FIGS. 1-6. However, those skilled in the art will readily appreciate that the detailed description given herein with respect to these figures is for explanatory purposes as the invention extends beyond these limited embodiments. It should be further noted that for the remainder of this discussion, the accessory device would be discussed in terms of an accessory device having a form factor along the lines of a laptop computer. However, more generally speaking, the accessory device can take many forms and be able to use any number of communication mechanisms and protocols for communication.

[0026] FIGS. 1-6 show various views of the accessory device in accordance with various embodiments. FIG. 1 shows in front facing perspective view an electronic host device decoupled from an electronic accessory device in accordance with the described embodiments. Accessory device 100 can be an electronic device and can be seen to take on the form factor of a conventional laptop computer. However, accessory device 100 does not generally possess the requisite processing resources (such as those associated with a CPU) and cannot act as a stand-alone unit. In this regard, accessory device 100 can act only as an adjunct to host device 102, such as by enhancing and expanding the functionality of host device 102, which can be an electronic device having its own CPU that can act independently on its own. Accessory device 100 can provide extended functionality and/or additional functionality than would otherwise